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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/605,447	09/30/2003	Nikolay Korovin	40696.0300	2446

20322 7590 12/14/2005

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EXAMINER
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ELEY, TIMOTHY V

ART UNIT	PAPER NUMBER
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3724

DATE MAILED: 12/14/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 10/605,447	<b>Applicant(s)</b> KOROVIN ET AL.	
	<b>Examiner</b> Timothy V. Eley	<b>Art Unit</b> 3724	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 01 December 2005.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-14 is/are pending in the application.
- 4a) Of the above claim(s) 12-14 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-9 is/are rejected.
- 7) ☒ Claim(s) 10 and 11 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

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**DETAILED ACTION**

***Claim Rejections - 35 USC § 102***

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1,2,4,6, and 8 are rejected under 35 U.S.C. 102(b) as being anticipated by Liu et al(5,720,845).

- Liu et al discloses a workpiece carrier comprising; a carrier housing including part 62, a workpiece bladder(38) coupled to the housing, the workpiece bladder having a surface configured to press against a surface of a workpiece; and at least one pressure transducer(29) mounted to the carrier housing for controlling pressure provided to the workpiece bladder. See figure 3, column 3, lines 39-end.
- Regarding claims 2 and 6, the bladder comprises a plurality of pressurizable zones and each zone has a pressure transducer for

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monitoring the pressure to that zone as clearly depicted in figure 3.

- Regarding claim 4, the workpiece carrier further comprises a control board(30) mounted to the carrier. See column 4, lines 8-13.

3. Claims 1,2,6, and 8 are rejected under 35 U.S.C. 102(e) as being anticipated by Berman et al(2003/0211811).

- Berman et al discloses a workpiece carrier comprising; inherently a carrier housing, a workpiece bladder(14) coupled to the housing, the workpiece bladder having a surface configured to press against a surface of a workpiece; and at least one pressure transducer(20) mounted to the carrier housing for controlling pressure provided to the workpiece bladder. See figure 1, paragraphs 20,25,26, and 28.
- Regarding claims 2 and 6, the bladder comprises a plurality of pressurizable zones and each zone has a pressure transducer for monitoring the pressure to that zone as clearly depicted in figure 1.

***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

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5. Claims 5 and 7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Liu et al or Berman et al, each considered independently, in view of Zias et al(4,051,712).

- Both Liu et al and Berman et al are explained above.
- Neither Liu et al nor Berman et al discloses an automatic calibration system for calibrating the at least one pressure transducer.
- However, Zias et al discloses that it is well known in the art to automatically calibrate a pressure transducer in order to maintain a desired pressure level. See abstract.
- Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified both the Liu et al and Berman et al apparatuses, each considered independently, by providing an automatic calibration system for automatically calibrating the at least one pressure transducer as taught by Zias et al in order to maintain desired pressure levels in the apparatuses.

Claims 3 and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Liu et al in view of Muller et al(5,980,361).

- Liu et al is explained above.
- Liu et al does not disclose at least one valve for the control system.

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- Muller et al discloses control valves for independently operating pressure chambers in a workpiece carrier for individually actuating different areas of a support plate 1.
- Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have modified the Liu et al apparatus by providing control valves for independently operating each of the actuators as taught by Muller et al for better control of the apparatus.

***Allowable Subject Matter***

6. Claims 10 and 11 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Conclusion***

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

- The cited references disclose individually operational pressure areas of a bladder.

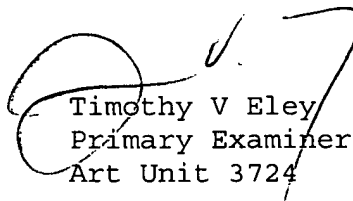
8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Timothy V. Eley whose telephone number is 571-272-4506. The examiner can normally be reached on M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Allan N. Shoap can be reached on 571-272-

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4514. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Timothy V Eley  
Primary Examiner  
Art Unit 3724

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